

AMENDMENTS TO THE CLAIMS

This listing of the claims will replace all prior versions, and listings, of claims in the application.

Listing if Claims:

1. (Currently Amended) Method for determining the presence of one or more specific steroid ligands in a sample, said method comprising;

a) contacting the sample with an array of cell lines, each cell line comprising a reporter gene construct responding to a cellular pathway which is induced by a different specific ligand at least two cell lines originating from the human osteoblastic cell line U2-OS, each cell line comprises a reporter gene construct responding to a cellular pathway which is induced by a steroid ligand; and each cell line comprises an expression plasmid coding for a different steroid or thyroid hormone receptor; or a ligand modifying factor;

b) measuring the activity of the reporter gene in the individual cell lines; and

c) comparing the measured activity in the individual cell lines; and determining the presence of the one or more steroid ligands in the sample based on effect profiling of the measured activity.

d) determining the presence of the ligands in the sample based on said comparison.

2-6. (Canceled)

7. (Currently Amended) The method as claimed in claim 635, wherein the hormone receptor is a steroid hormone receptor or thyroid hormone receptor.

8. (Currently Amended) The method as claimed in claim 635, wherein the reporter gene construct comprises DNA coding for an operative hormone responsive element linked to a promoter and a reporter gene.

9. (Previously Presented) The method as claimed in claim 8, wherein the reporter gene construct comprises 3 tandem repeats of the hormone responsive element (HRE) oligonucleotide:
AAGCTTAGAACAGTTTGTAAACGAGCTCGTTACAAACTGTTCTAGCTCGTTACAAACTGTTCT
TAAGCTCAAGCTT (SEQ ID NO. 1) upstream of the minimal adenovirus E1B TATA promoter sequence (GGGTATATAAT) (SEQ ID NO. 2) inserted in the multiple cloning site of the luciferase reporter construct pGL3.

10. (Previously Presented) The method as claimed in claim 8, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

11. (Currently Amended) The method as claimed in claim 531, wherein the specific component is a ligand modifying factor.

12. (Previously Presented) The method as claimed in claim 11, wherein the ligand modifying factor is an enzyme.

13. (Withdrawn) Human osteoblastic cell line U2-OS, comprising a reporter gene construct comprising DNA coding for an operative hormone responsive element linked to a promoter and a reporter gene, and one or more expression plasmids comprising DNA coding for a hormone receptor, wherein the hormone receptor is selected from the group consisting of androgen receptor, progesterone receptor, glucocorticoid receptor, mineralocorticoid receptor, and thyroid receptor.

14. (Withdrawn) Human osteoblastic cell line as claimed in claim 13, wherein the reporter gene construct comprises 3 tandem repeats of the hormone responsive element (HRE) oligonucleotide: AAGCTTAGAACAGTTTGTAAACGAGCTCGTTACAAACTGTTCTAGCTCGTTACAAACTGTTC TAAGCTCAAGCTT (SEQ ID NO. 1) upstream of the minimal adenovirus E1B TATA promoter sequence (GGGTATATAAT) (SEQ ID NO. 2) inserted in the multiple cloning site of the luciferase reporter construct pGL3.

15. (Withdrawn) Human osteoblastic cell line as claimed in claim 13, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

16. (Withdrawn) Use of human osteoblastic cell lines in an assay for determining the presence of one or more ligands in a sample.

17. (Withdrawn) Use as claimed in claim 16, wherein the cell line is the U2-OS cell line.

18. (Withdrawn and Currently Amended) The method as claimed in claim 226 wherein the array comprises at least two cell lines, preferably at least three cell lines.
19. (Withdrawn and Currently Amended) The method as claimed in claim 226, wherein one or more of the cell lines comprise one or more expression plasmids each coding for a specific component of the cellular pathway.
20. (Withdrawn and Currently Amended) The method as claimed in claim 327, wherein the array comprises at least two cell lines, preferably at least three cell lines.
21. (Withdrawn and Currently Amended) The method of claim 327, wherein one or more of the cell lines comprise one or more expression plasmids each coding for a specific component of the cellular pathway.
22. (Withdrawn and Currently Amended) The method of claim 429 wherein one or more of the cell lines comprise one or more expression plasmids each coding for a specific component of the cellular pathway.
23. (Withdrawn) The method of claim 7, wherein the reporter gene construct comprises DNA coding for an operative hormone responsive element linked to a promoter and a reporter gene.
24. (Withdrawn) The method of claim 9, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.
25. (Withdrawn) Human osteoblastic cell line as claimed in claim 14 wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.
26. (New) The method of claim 1, wherein the array comprises at least three cell lines.
27. (New) The method of claim 1, wherein the reporter gene construct comprises DNA coding for an operative hormone responsive element linked to a promoter and a reporter gene.

28. (New) The method of claim 26, wherein the reporter gene construct comprises DNA coding for an operative hormone responsive element linked to a promoter and a reporter gene.

29. (New) The method of claim 27, wherein the reporter gene construct comprises 3 tandem repeats of the hormone responsive element (HRE) oligonucleotide:

AAGCTTAGAACAGTTTGTAAACGAGCTCGTTACAAACTGTTCTAGCTCGTTACAAACTGTTCT

TAACTCAAGCTT (SEQ ID NO. 1) upstream of the minimal adenovirus E1B TATA promoter sequence (GGGTATATAAT) (SEQ ID NO. 2) inserted in the multiple cloning site of the luciferase reporter construct pGL3.

30. (New) The method of claim 28, wherein the reporter gene construct comprises 3 tandem repeats of the hormone responsive element (HRE) oligonucleotide:

AAGCTTAGAACAGTTTGTAAACGAGCTCGTTACAAACTGTTCTAGCTCGTTACAAACTGTTCT

TAACTCAAGCTT (SEQ ID NO. 1) upstream of the minimal adenovirus E1B TATA promoter sequence (GGGTATATAAT) (SEQ ID NO. 2) inserted in the multiple cloning site of the luciferase reporter construct pGL3.

31. (New) The method of claim 27, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

32. (New) The method of claim 28, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

33. (New) The method of claim 29, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

34. (New) The method of claim 30, wherein the DNA coding for the different hormone receptors is introduced in the pSG5 expression plasmid.

35. (New) The method of claim 1, wherein the ligand modifying factor is an enzyme.

36. (New) The method as claimed in claim 32, wherein the specific component is a ligand modifying factor.

37. (New) The method as claimed in claim 33, wherein the specific component is a ligand modifying factor.

38. (New) The method as claimed in claim 34, wherein the specific component is a ligand modifying factor.

39. (New) The method as claimed in claim 28, wherein the array comprises at least two cell lines, preferably at least three cell lines.

40. (New) The method of claim 28, wherein one or more of the cell lines comprise one or more expression plasmids each coding for a specific component of the cellular pathway.

41. (New) The method of claim 30 wherein one or more of the cell lines comprise one or more expression plasmids each coding for a specific component of the cellular pathway.